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**Engineering and Design
HYDROGRAPHIC SURVEYING**

1. Purpose. This manual establishes criteria and presents policy and guidance for performing hydrographic surveying in support of planning, engineering and design, construction, operation, maintenance, and regulation of civil works navigation and flood control projects. Procedural and quality control standards are defined to establish Corps-wide uniformity in construction contract administration, payment, and acceptance.

2. Applicability. This manual applies to all HQUSACE elements, major subordinate commands (MSC), districts, laboratories, and field operating activities which perform, contract, or monitor hydrographic surveys in support of civil works activities. Certain portions of this manual are also applicable to USACE functional areas having responsibility for marine design, construction, and investigation activities, such as dredge plant positioning and control, dredging or other marine construction contract administration, offshore geotechnical investigations, marine environmental investigations and studies, and coastal regulatory enforcement activities. This manual may be referenced should hydrographic surveying functions be required as part of a USACE military construction or environmental restoration activity. It is also applicable to surveys performed or procured by local interest groups under various cooperative or cost-sharing agreements.

3. Discussion. Hydrographic surveying is performed to determine the subsurface topography (or bathymetry) of a site which affects the planning, acquisition, design, construction, operation, and maintenance of various types of planned or previously constructed projects. The basic principles and techniques of hydrographic surveying are also employed in positioning other marine construction and investigative platforms. Insufficient, inaccurate, or misinterpreted hydrographic surveys can contribute to costly errors and omissions in the various phases of project development. This directly impacts incidences of construction claims as well as navigation safety. Therefore, the intent of this manual is to establish definitive standards along with survey performance and procedural policy which will ensure uniform and accurate hydrographic surveying products. This will reduce costly errors, enhance the equitability of contracted construction administration, and increase the overall quality and safety of Corps projects.

FOR THE COMMANDER:


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This manual supersedes EM 1110-2-1003, dated 28 February 1991.